
Conversion Factors For Production Traits. Source: INTERBULL 1512

Converted Canadian Proof = A + (B* Foreign Proof)
 Converted Proof Reliability = PCORR2*Foreign Reliability

breed	country2	amilk	bmilk	afat	bfat	aprot	bprot	pcorr2
AYS	AUS	462.90	1.2150	30.500	1.4130	23.800	1.3890	0.5476
AYS	DEU	508.00	0.9120	38.600	0.8600	28.600	0.8690	0.7569
AYS	DFS	-4479.30	55.5650	-166.700	2.1580	-117.500	1.6470	0.8100
AYS	EST	560.20	1.0820	26.300	1.1410	26.400	1.0470	0.7225
AYS	GBR	-195.30	2.5080	-4.500	2.7530	-1.700	2.7890	0.7225
AYS	IRL	756.05	3.6680	22.451	3.4055	22.776	4.0428	0.5776
AYS	LTU	-431.60	1.6410	-0.900	1.3300	-2.900	1.6680	0.7396
AYS	LVA	359.80	1.9420	23.700	1.6960	20.000	2.1100	0.7056
AYS	NLD	1687.64	0.8950	59.080	0.8026	58.581	0.7429	0.7569
AYS	NOR	-4636.50	53.7140	-171.500	2.0370	-125.100	1.6060	0.7921
AYS	NZL	16.00	1.6800	28.200	1.5240	13.700	1.8120	0.5184
AYS	USA	-85.60	0.8830	-7.800	0.9210	-4.100	0.9020	0.8281
AYS	ZAF	76.25	0.8834	1.177	0.9520	4.097	0.9033	0.6561

Conversion Factors For SCS Traits. Source: INTERBULL 1512

Converted Canadian Proof = A + (B* Foreign Proof)
 Converted Proof Reliability = SCORR2*Foreign Reliability

breed	country2	a	b	scorr2
AYS	AUS	3.800	-0.0070	0.7569
AYS	DEU	4.800	-0.0170	0.8464
AYS	DFS	4.800	-0.0180	0.8464
AYS	EST	4.900	-0.0190	0.7744
AYS	GBR	3.000	0.0200	0.8649
AYS	LTU	3.100	0.6240	0.7569
AYS	LVA	3.100	0.5080	0.7744
AYS	NLD	-2.898	0.0582	0.8281
AYS	NOR	4.900	-0.0190	0.8281
AYS	NZL	3.200	0.5200	0.6724
AYS	USA	-0.100	1.0560	0.8649
AYS	ZAF	2.994	0.0091	0.7921

Conversion Factors For Type. Source = INTERBULL MACE 1512

Converted Canadian Proof = A + (B* Foreign Proof)
 Converted Proof Reliability = TCORR2*Foreign Reliability

country2=AUS

c	c	f			
a	o	o			
n	u	r	a	b	t
b	n	t	v	v	c
r	t	r	a	a	o
e	r	a	l	l	r
e	y	i	u	u	r
d	2	t	e	e	2

AYS CONFORMATION	AUS CONFORMATION	-75.231	0.6975	0.37
AYS FEET AND LEGS	AUS OVERALL FEET & LEG	-43.098	0.3824	
AYS MAMMARY SYSTEM	AUS OVERALL UDDER SCORE	-75.443	0.7043	
AYS STATURE	AUS STATURE	-96.561	0.9283	
AYS CHEST WIDTH	AUS CHEST WIDTH	-73.600	0.7553	
AYS BODY DEPTH	AUS BODY DEPTH	-87.187	0.8523	
AYS PIN WIDTH	AUS RUMP WIDTH	-85.249	0.8412	
AYS RUMP ANGLE	AUS RUMP ANGLE	-81.262	0.7996	
AYS FOOT ANGLE	AUS FOOT ANGLE	-65.194	0.6477	
AYS REAR LEGS SIDE VIEW	AUS REAR LEG SET	-59.624	0.6439	
AYS REAR LEG REAR VIEW	AUS REAR LEG REAR VIEW	-60.380	0.5772	
AYS UDDER DEPTH	AUS UDDER DEPTH	-80.163	0.7558	
AYS MEDIAN SUSPENSORY	AUS MEDIAN SUSPENSORY	-73.253	0.7122	
AYS FORE ATTACHMENT	AUS FORE UDDER	-71.097	0.6644	
AYS TEAT PLACEMENT	AUS FRONT TEAT PLACEMENT	-73.024	0.7208	
AYS TEAT LENGTH	AUS TEAT LENGTH	-84.812	0.8604	
AYS REAR ATTACHMENT HEIGHT	AUS REAR UDDER HEIGHT	-85.911	0.7782	
AYS REAR TEAT PLACEMENT	AUS REAR TEAT PLACEMENT	-86.482	0.8355	
AYS ANGULARITY	AUS ANGULARITY	-68.696	0.6255	

Conversion Factors For Type. Source = INTERBULL MACE 1512
 Converted Canadian Proof = A + (B* Foreign Proof)
 Converted Proof Reliability = TCORR2*Foreign Reliability

country2=DEU

c	c	f			
a	o	o			
n	u	r	a	b	t
b	n	t	v	v	c
r	t	r	a	a	o
e	r	a	l	l	r
e	y	i	u	u	r
d	2	t	e	e	2

AYS FEET AND LEGS	DEU OVERALL FEET & LEG	-37.809	0.3701
AYS MAMMARY SYSTEM	DEU OVERALL UDDER SCORE	-38.870	0.3614
AYS STATURE	DEU STATURE	-43.198	0.4573
AYS CHEST WIDTH	DEU CHEST WIDTH	-48.688	0.5076
AYS BODY DEPTH	DEU BODY DEPTH	-53.314	0.5555
AYS PIN WIDTH	DEU RUMP WIDTH	-56.992	0.6092
AYS RUMP ANGLE	DEU RUMP ANGLE	-73.697	0.6960
AYS FOOT ANGLE	DEU FOOT ANGLE	-37.060	0.4012
AYS REAR LEGS SIDE VIEW	DEU REAR LEG SET	-69.141	0.6782
AYS REAR LEG REAR VIEW	DEU REAR LEG REAR VIEW	-61.492	0.6232
AYS UDDER DEPTH	DEU UDDER DEPTH	-50.430	0.4838
AYS MEDIAN SUSPENSORY	DEU MEDIAN SUSPENSORY	-45.388	0.4525
AYS FORE ATTACHMENT	DEU FORE UDDER	-55.042	0.5025
AYS FRONT TEAT PLACEMENT	DEU FRONT TEAT PLACEMENT	-44.085	0.4137
AYS TEAT LENGTH	DEU TEAT LENGTH	-37.479	0.3673
AYS REAR ATTACHMENT HEIGHT	DEU REAR UDDER HEIGHT	-43.855	0.3905
AYS REAR TEAT PLACEMENT	DEU REAR TEAT PLACEMENT	-45.687	0.4251
AYS ANGULARITY	DEU ANGULARITY	-47.374	0.4745

Conversion Factors For Type. Source = INTERBULL MACE 1512

Converted Canadian Proof = A + (B* Foreign Proof)
 Converted Proof Reliability = TCORR2*Foreign Reliability

country2=DFS

c		c		f				
a		o		o				
n		u		r		a	b	t
b		n		t		v	v	c
r		t		r		a	a	o
e		r		a		l	l	r
e		y		i		u	u	r
d		2		t		e	e	2
AYS	CONFORMATION	DFS	OVERALL CONFORMATION	-51.856	0.4740	0.53		
AYS	FEET AND LEGS	DFS	OVERALL FEET & LEG	-42.197	0.3956			
AYS	MAMMARY SYSTEM	DFS	OVERALL UDDER SCORE	-47.671	0.4492			
AYS	STATURE	DFS	STATURE	-65.547	0.6398			
AYS	CHEST WIDTH	DFS	CHEST WIDTH	-44.588	0.4629			
AYS	BODY DEPTH	DFS	BODY DEPTH	-46.494	0.4321			
AYS	PIN WIDTH	DFS	RUMP WIDTH	-51.595	0.5148			
AYS	RUMP ANGLE	DFS	RUMP ANGLE	-56.359	0.5668			
AYS	FOOT ANGLE	DFS	FOOT ANGLE	-46.668	0.4820			
AYS	REAR LEGS SIDE VIEW	DFS	REAR LEG SET	-63.779	0.6758			
AYS	REAR LEG REAR VIEW	DFS	REAR LEG REAR VIEW	-55.367	0.5428			
AYS	UDDER DEPTH	DFS	UDDER DEPTH	-51.397	0.5043			
AYS	MEDIAN SUSPENSORY	DFS	MEDIAN SUSPENSORY	-39.718	0.3815			
AYS	FORE ATTACHMENT	DFS	FORE UDDER	-44.572	0.4228			
AYS	FRONT TEAT PLACEMENT	DFS	FRONT TEAT PLACEMENT	-41.067	0.4079			
AYS	TEAT LENGTH	DFS	TEAT LENGTH	-42.813	0.4136			
AYS	REAR ATTACHMENT HEIGHT	DFS	REAR UDDER HEIGHT	-55.678	0.4986			
AYS	REAR TEAT PLACEMENT	DFS	REAR TEAT PLACEMENT	-44.993	0.4337			
AYS	ANGULARITY	DFS	ANGULARITY	-62.731	0.5728			

 Conversion Factors For Type. Source = INTERBULL MACE 1512
 Converted Canadian Proof = A + (B* Foreign Proof)
 Converted Proof Reliability = TCORR2*Foreign Reliability

country2=GBR

c		c		f				
a		o		o				
n		u		r		a	b	t
b		n		t		v	v	c
r		t		r		a	a	o
e		r		a		l	l	r
e		y		i		u	u	r
d		2		t		e	e	2
AYS	FEET AND LEGS	GBR	OVERALL FEET & LEG	-3.180	2.6064			
AYS	MAMMARY SYSTEM	GBR	OVERALL UDDER SCORE	-1.864	3.3514			
AYS	STATURE	GBR	STATURE	-3.568	4.6178			
AYS	CHEST WIDTH	GBR	CHEST WIDTH	1.881	3.7899			
AYS	BODY DEPTH	GBR	BODY DEPTH	0.073	3.4245			
AYS	PIN WIDTH	GBR	RUMP WIDTH	-1.268	3.7313			
AYS	RUMP ANGLE	GBR	RUMP ANGLE	-1.461	4.1324			
AYS	FOOT ANGLE	GBR	FOOT ANGLE	-0.771	2.7199			
AYS	REAR LEGS SIDE VIEW	GBR	REAR LEG SET	-0.752	3.1783			

AYS	UDDER DEPTH	GBR	UDDER DEPTH	-1.189	2.8698
AYS	MEDIAN SUSPENSORY	GBR	MEDIAN SUSPENSORY	-0.415	2.7733
AYS	FORE ATTACHMENT	GBR	FORE UDDER	-0.103	2.7656
AYS	TEAT PLACEMENT	GBR	FRONT TEAT PLACEMENT	1.744	3.1362
AYS	TEAT LENGTH	GBR	TEAT LENGTH	-0.958	3.0783
AYS	REAR ATTACHMENT HEIGHT	GBR	REAR UDDER HEIGHT	-3.797	3.7043
AYS	ANGULARITY	GBR	ANGULARITY	-6.303	4.7988

Conversion Factors For Type. Source = INTERBULL MACE 1512
 Converted Canadian Proof = A + (B* Foreign Proof)
 Converted Proof Reliability = TCORR2*Foreign Reliability

country2=NLD

	c		c	f				
	a		o	o		a	b	t
	n		u	r		v	v	c
b	t		n	t		a	a	o
r	r		t	r		l	l	r
e	a		r	a		u	u	r
e	i		y	i		e	e	r
d	t		2	t				2
AYS	CONFORMATION	NLD	CONFORMATION	-139.330	1.4651	0.64		
AYS	FEET AND LEGS	NLD	OVERALL FEET & LEG	-62.919	0.6218			
AYS	MAMMARY SYSTEM	NLD	OVERALL UDDER SCORE	-104.692	1.1017			
AYS	STATURE	NLD	STATURE	-117.499	1.2953			
AYS	CHEST WIDTH	NLD	CHEST WIDTH	-123.969	1.3294			
AYS	BODY DEPTH	NLD	BODY DEPTH	-104.068	1.1428			
AYS	PIN WIDTH	NLD	RUMP WIDTH	-89.217	0.9663			
AYS	RUMP ANGLE	NLD	RUMP ANGLE	-99.798	0.9854			
AYS	FOOT ANGLE	NLD	FOOT ANGLE	-109.261	1.1510			
AYS	REAR LEGS SIDE VIEW	NLD	REAR LEG SET	-109.918	1.0779			
AYS	REAR LEG REAR VIEW	NLD	REAR LEG REAR VIEW	-118.406	1.2097			
AYS	UDDER DEPTH	NLD	UDDER DEPTH	-111.082	1.1432			
AYS	MEDIAN SUSPENSORY	NLD	MEDIAN SUSPENSORY	-103.696	1.0707			
AYS	FORE ATTACHMENT	NLD	FORE UDDER	-123.140	1.2515			
AYS	TEAT PLACEMENT	NLD	FRONT TEAT PLACEMENT	-131.764	1.3634			
AYS	TEAT LENGTH	NLD	TEAT LENGTH	-80.302	0.8159			
AYS	REAR ATTACHMENT HEIGHT	NLD	REAR UDDER HEIGHT	-85.016	0.8879			
AYS	REAR TEAT PLACEMENT	NLD	REAR TEAT PLACEMENT	-120.932	1.2280			
AYS	ANGULARITY	NLD	ANGULARITY	-77.726	0.8407			

Conversion Factors For Type. Source = INTERBULL MACE 1512
 Converted Canadian Proof = A + (B* Foreign Proof)
 Converted Proof Reliability = TCORR2*Foreign Reliability

country2=NOR

	c		c	f				
	a		o	o		a	b	t
	n		u	r		v	v	c
b	t		n	t		a	a	o
r	r		t	r		l	l	r
e	a		r	a		u	u	r
e	i		y	i				

d	t	2	t	e	e	2
AYS	CONFORMATION	NOR	OVERALL CONFORMATION	-28.944	0.2014	0.34
AYS	FEET AND LEGS	NOR	OVERALL FEET & LEG	-39.715	0.3345	
AYS	MAMMARY SYSTEM	NOR	OVERALL UDDER SCORE	-52.506	0.4452	
AYS	STATURE	NOR	STATURE	-53.111	0.4546	
AYS	BODY DEPTH	NOR	BODY DEPTH	-38.379	0.3417	
AYS	RUMP ANGLE	NOR	RUMP ANGLE	-46.236	0.4798	
AYS	FOOT ANGLE	NOR	FOOT ANGLE	-29.339	0.2957	
AYS	REAR LEGS SIDE VIEW	NOR	REAR LEG SET	-36.063	0.4070	
AYS	REAR LEG REAR VIEW	NOR	REAR LEG REAR VIEW	-46.135	0.4294	
AYS	UDDER DEPTH	NOR	UDDER DEPTH	-50.610	0.4448	
AYS	MEDIAN SUSPENSORY	NOR	MEDIAN SUSPENSORY	-35.803	0.3027	
AYS	FORE ATTACHMENT	NOR	FORE UDDER	-50.221	0.4505	
AYS	FRONT TEAT PLACEMENT	NOR	FRONT TEAT PLACEMENT	-41.947	0.3841	
AYS	TEAT LENGTH	NOR	TEAT LENGTH	-40.912	0.3895	
AYS	REAR ATTACHMENT HEIGHT	NOR	REAR UDDER HEIGHT	-53.925	0.4195	
AYS	REAR TEAT PLACEMENT	NOR	REAR TEAT PLACEMENT	-32.638	0.3033	

Conversion Factors For Type. Source = INTERBULL MACE 1512
 Converted Canadian Proof = A + (B* Foreign Proof)
 Converted Proof Reliability = TCORR2*Foreign Reliability

country2=NZL

c	a	n	b	r	e	e	d	c	f	o	u	n	t	a	b	v	a	l	u	e	t	c	o	r	r	2
AYS	CONFORMATION	NZL	OVERALL CONFORMATION	-8.523	11.3983																					0.30
AYS	MAMMARY SYSTEM	NZL	OVERALL UDDER SCORE	-8.542	12.2754																					
AYS	STATURE	NZL	STATURE	-10.651	10.6459																					
AYS	CHEST WIDTH	NZL	CHEST WIDTH	0.981	12.1878																					
AYS	BODY DEPTH	NZL	BODY DEPTH	-2.910	11.6115																					
AYS	PIN WIDTH	NZL	RUMP WIDTH	-3.734	17.4804																					
AYS	RUMP ANGLE	NZL	RUMP ANGLE	-4.836	19.3059																					
AYS	REAR LEGS SIDE VIEW	NZL	REAR LEG SET	3.690	43.7591																					
AYS	MEDIAN SUSPENSORY	NZL	MEDIAN SUSPENSORY	-3.922	13.0153																					
AYS	FORE ATTACHMENT	NZL	FORE UDDER	-7.639	14.3020																					
AYS	FRONT TEAT PLACEMENT	NZL	FRONT TEAT PLACEMENT	-4.643	17.6242																					
AYS	REAR ATTACHMENT HEIGHT	NZL	REAR UDDER HEIGHT	-8.309	14.5717																					
AYS	REAR TEAT PLACEMENT	NZL	REAR TEAT PLACEMENT	-5.751	16.5664																					

Conversion Factors For Type. Source = INTERBULL MACE 1512
 Converted Canadian Proof = A + (B* Foreign Proof)
 Converted Proof Reliability = TCORR2*Foreign Reliability

country2=USA

c	a	c	f

b	n	u	r	a	b	t
r	t	n	t	v	v	c
e	a	t	r	a	a	o
e	i	r	a	l	l	r
d	t	y	i	u	u	r
		2	t	e	e	2

AYS	CONFORMATION	USA	CONFORMATION	-2.124	6.1243	0.69
AYS	FEET AND LEGS	USA	OVERALL FEET & LEG	-2.183	4.4324	
AYS	MAMMARY SYSTEM	USA	OVERALL UDDER SCORE	0.139	5.9347	
AYS	STATURE	USA	STATURE	-0.758	2.8200	
AYS	CHEST WIDTH	USA	CHEST WIDTH	-0.226	5.7363	
AYS	BODY DEPTH	USA	BODY DEPTH	-1.410	4.5984	
AYS	PIN WIDTH	USA	RUMP WIDTH	-0.150	4.5285	
AYS	RUMP ANGLE	USA	RUMP ANGLE	-0.825	5.5955	
AYS	FOOT ANGLE	USA	FOOT ANGLE	0.082	6.8908	
AYS	REAR LEGS SIDE VIEW	USA	REAR LEG SET	0.947	8.7470	
AYS	UDDER DEPTH	USA	UDDER DEPTH	0.287	4.9222	
AYS	MEDIAN SUSPENSORY	USA	MEDIAN SUSPENSORY	-1.219	5.1455	
AYS	FORE ATTACHMENT	USA	FORE UDDER	-0.629	4.9608	
AYS	TEAT PLACEMENT	USA	FRONT TEAT PLACEMENT	0.095	4.3573	
AYS	TEAT LENGTH	USA	TEAT LENGTH	-0.572	4.1071	
AYS	REAR ATTACHMENT HEIGHT	USA	REAR UDDER HEIGHT	-0.683	4.8789	
AYS	ANGULARITY	USA	ANGULARITY	-0.603	6.6626	

CALCULATION OF FAT% AND PROTEIN% FOR DECEMBER 2015

BREED	BMILK	BFAT	BPRT
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AYS	7548	311	255
BSW	8067	338	285
CN	5354	233	189
GUE	6631	306	230
JER	6418	320	245
HOL	9934	379	318
MS	6942	262	226

$$EBVFAT\% = 200 * [(BFAT + EBVFAT * 0.5) / (BMILK + EBVMILK * 0.5) - (BFAT / BMILK)]$$

$$EBVPROT\% = 200 * [(BPRT + EBVPRT * 0.5) / (BMILK + EBVMILK * 0.5) - (BPRT / BMILK)]$$

EXAMPLE :

A HOLSTEIN bull has EBV MILK=+1000, EBVFAT=+50, EBVPROT=+40

$$\begin{aligned}
 EBVFAT\% &= 200 * [(379 + 50 * 0.5) / (9934 + 1000 * 0.5) - (379 / 9934)] \\
 &= 200 * [(379 + 25) / (9934 + 500) - (0.03815)] \\
 &= 200 * [0.03872 - 0.03815] \\
 &= 200 * 0.00057 \\
 &= 0.11
 \end{aligned}$$

$$\begin{aligned}
 EBVPROT\% &= 200 * [(318 + 40 * 0.5) / (9934 + 1000 * 0.5) - (318 / 9934)] \\
 &= 200 * [(318 + 20) / (9934 + 500) - (0.03201)] \\
 &= 200 * [0.03239 - 0.03201] \\
 &= 200 * 0.00038 \\
 &= 0.08
 \end{aligned}$$